

Executive Summary

The Sterling and Francine Clark Art Museum is located in Williamstown Massachusetts. Its multi-building campus is dedicated to the advancement of the arts through museum exhibits, conferences and educational resources. Although it is contending for LEED certification, it currently uses significantly more energy than is necessary with today's advancement in efficacious, high CRI LED sources. Additionally, the accessibility of artwork that The Clark is striving to present through programs and facility design are realized for the older patrons but not the younger guests.

This proposal includes lighting designs for four spaces, electrical power system designs, an architectural study, and a structural study.

The lighting and electrical redesigns are the focus of the report. The proposal for lighting and electrical systems focuses on the following four spaces: a woodshop, multi-use space, lobby, and terrace. The lighting designs complement the attention to detail that architect Tadao Ando has given to positioning and finishing his prominent vertical surfaces. Each space's electrical redesign accounts for the lighting redesign and adds additional loads on the spare circuits. Two electrical depth topics are explored: a rooftop photovoltaic system and cogeneration system. A feasibility study is performed for each. The structural considerations for adding a PV system to the roof are discussed in the structural breadth study. An additional architectural and media breadth study explores the use multimedia motion sensing technology to foster the interactive element of artwork that The Clark has been struggling to create for younger visitors.

The lighting, electrical, structural and architectural studies together form a proposal that will better reflect the sustainability goals and of the VECC as well as foster an interactive educational experience.